TOSHIBA

STEREO RADIO CASSETTE PLAYER

KT-4568

SPECIFICATIONS

Track system:	Stereophonic
Recommended tape:	Normal ferric, chrome dioxide, and metal alloy: C-30 to C-90 (Recorded tape)
Tape speed:	4.8 cm/sec.
Frequency response:	Reproduction: 40 Hz to 14 kHz (normal), 40 Hz to 16 kHz ($METAL/CrO_2$)
Graphic equalizer:	100 Hz, 1 kHz, 10 kHz
Receiving frequency:	U.S.A., Canada FM: 87.5 MHz to 108 MHz (0.1 MHz steps) AM: Case ① 530 kHz to 1610 kHz (10 kHz steps) Case ② 531 kHz to 1602 kHz (9 kHz steps) Europe, Australia, others FM: 87.5 MHz to 108 MHz (0.05 MHz steps) AM: Case ① 531 kHz to 1602 kHz (9 kHz steps) Case ② 530 kHz to 1610 kHz (10 kHz steps)
Intermediate frequency:	FM: 10.7 MHz AM: 450 kHz
Antenna:	FM: Headphones cord AM: Ferrite-core antenna
Output terminal:	3.5 mm dia. stereo headphones jack x 1
Maximum output power:	Integration 60 mW (30 mW + 30 mW)
Power supply:	3V DC (IEC R6 "AA" cell x 2) External power source supplied to the [DC IN 3V] jack (3.4 mm dia. center connect negative).
Dimensions:	83.5(W) x 120(H) x 32.8 (D) mm
Weight:	245g (without batteries)

Specifications are subject to change without notice.

K-TA, TC, TE, AY, VF

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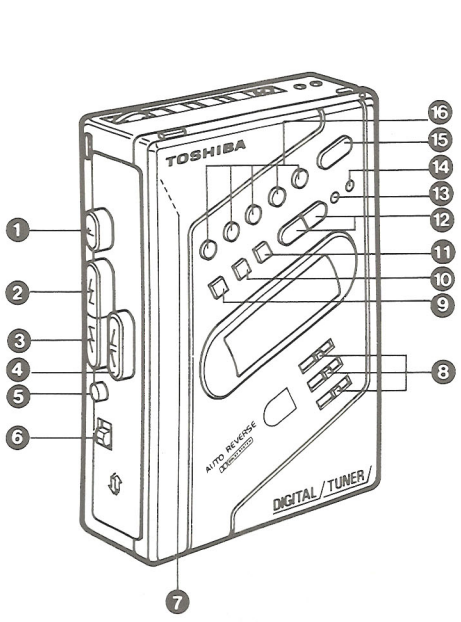
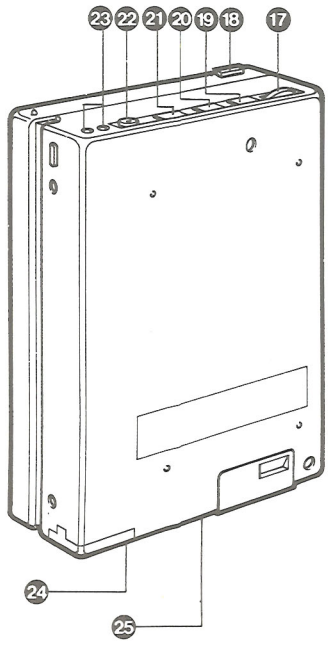
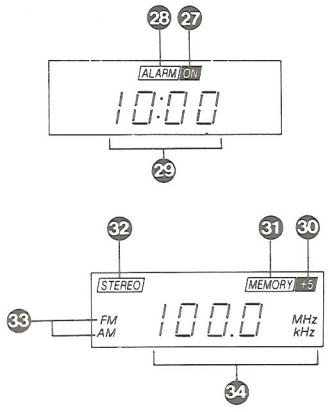
OPERATING CONTROLS





Indicator Section



1. [■ STOP] button
2. [▶▶ REW/FF] button
3. [◀◀ FF/REW] button
4. [◀▶ PLAY] button
5. [DIRECTION] button
6. [REVERSE MODE] selector
7. AM Step Frequency selector (Inside of the cassette compartment lid)
8. [GRAPHIC EQUALIZER] controls
9. [+5] button
10. [MEMORY] button
11. [FM/AM] band button
12. [< TUNING >] Tuning buttons/ [HOUR, MIN] Time set buttons (dual operation)
13. [MODE] button
14. [ALARM] button
15. [ALARM STOP] button
16. Preset buttons
17. [VOLUME] control
18. [OPEN] button
19. [NORMAL, METAL/CrO_2] Tape selector
20. [FM-MONO, FM-ST] FM mode selector/[DD OFF, DD ON] Dolby* NR selector (dual operation)
21. [TAPE/RADIO [OFF] , RADIO] Function selector
22. [PHONES] jack
23. [FWD, REV] Tape direction indicators/[BATT] indicators (dual operation)
24. Battery compartment lid
25. [DC IN 3V] jack
26. Headphones

* Dolby noise reduction manufactured under license from Dolby Laboratories Licensing Corporation. "DOLBY" and the double-D symbol DD are trademarks of Dolby Laboratories Licensing Corporation.

Indicator Section

- This indicator section contains both the time and radio displays.

For the time display:

27. [ALARM ON] indicator
28. [ALARM] indicator
29. [TIME] indicator

For the radio display:

30. [+5] indicator
31. [MEMORY] indicator
32. [STEREO] indicator
33. [FM, AM] indicator
34. Frequency indicator

Europe/Australia/Others

U.S.A./Canada

DISASSEMBLY INSTRUCTIONS

BACK CABINET REMOVAL

1. Remove one screw Ⓐ, two screws Ⓑ and two screws Ⓒ.
   Note 1: For the model whose model number is more than #22001, one screw is added on the Ⓓ section. So remove the screw also when removing the back cabinet.
2. Remove the back cabinet from the unit slowly.
   Note 2: The mask sheet is pasted on the Ⓓ section of the back cabinet for servicing. For the unit with the screw is tightened on the Ⓓ section, remove the mask sheet by using the screwdriver.

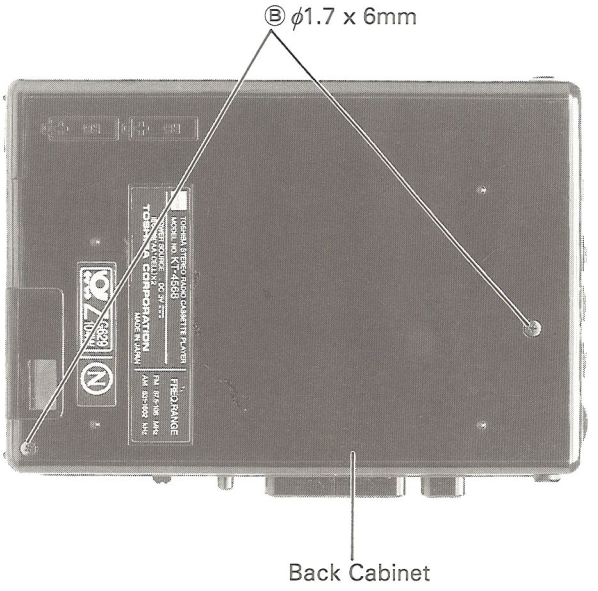


Figure 1

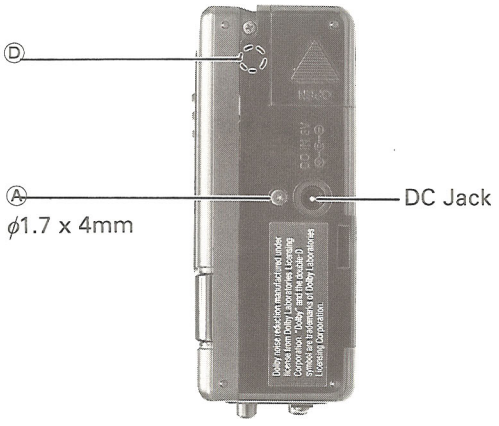


Figure 2

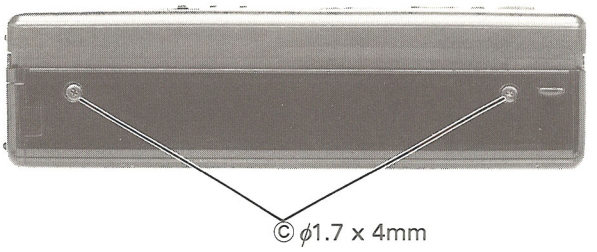


Figure 3

FRONT CABINET REMOVAL

1. Remove the back cabinet.
2. Remove two screws Ⓔ.
3. Remove the front cabinet from the Ⓕ or Ⓖ section.
   Note 3: There are steel balls and springs in the Ⓕ and Ⓖ section. Be sure not to miss them.

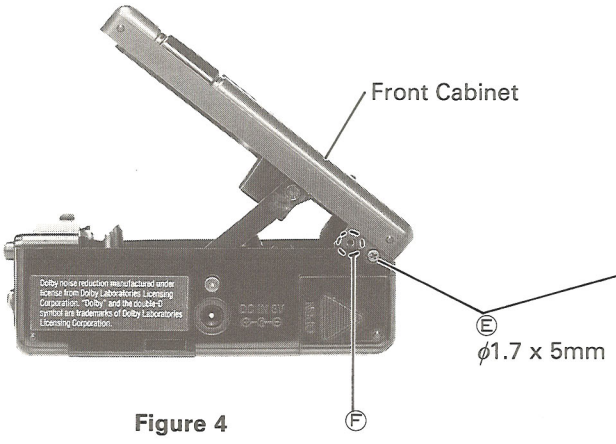


Figure 4

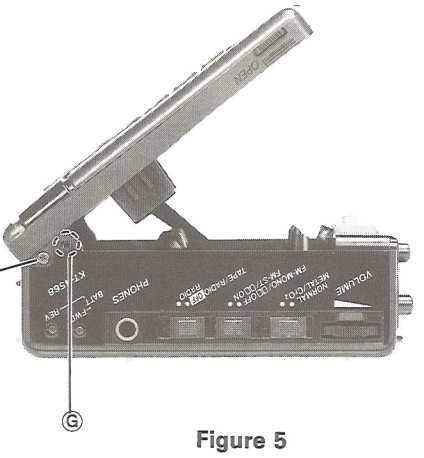


Figure 5

ADJUSTMENTS

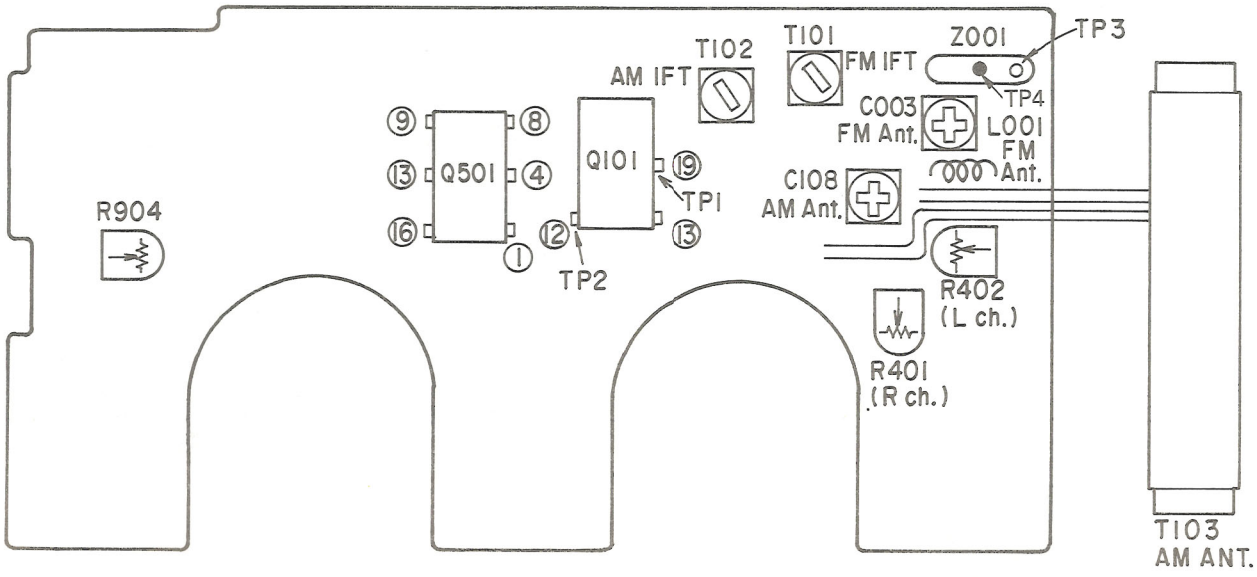


Figure 6

AM ALIGNMENT

1. Turn on the AM signal generator, sweep generator and the VTVM allowing a fifteen-minute warm-up period.
2. First, do the AM-IF-Alignment (AM ALIGNMENT CHART), refering to Figure 7.
3. Using the test loop across the output of the signal generator, inductively connect the signal generator to the radio. (Figure 8)
4. Connect the VTVM across the Pins No. 12 and 19 (Q101)
5. Set signal generator frequency as listed in ALIGNMENT CHART and maintain a sufficient output level to provide an indication on VTVM.
6. Set volume control at mid-position.

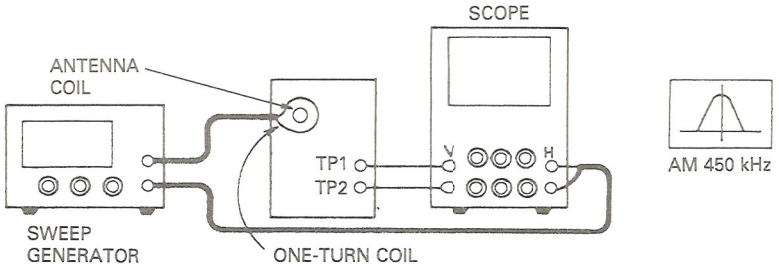


Figure 7

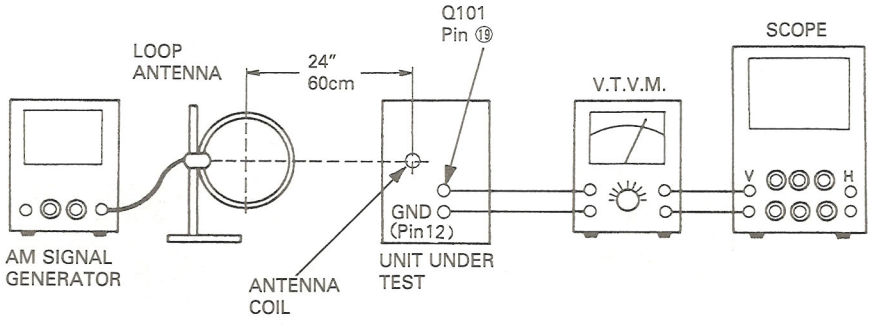


Figure 8

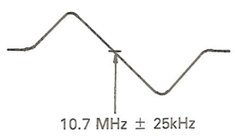
AM ALIGNMNET CHART

Band	Step	Signal Generator Frequency	Frequency Setting	Adjustment	Remarks
AM-IF	1	450 kHz	Lowest Frequency	T102	Adjust coil T102 until best signal peak is obtained.
AM	2	600 kHz	Tune to Signal.	Ant. Coil T103	Adjust for maximum inidication.
	3	1400 kHz	Tune to Signal.	Ant. Trim. C108	Adjust for maximum indication.
	4	Repeat steps 2 and 3 as required.			

FM-IF ALIGNMENT

1. Set the select switch to FM position.
2. Turn on both sweep generator and oscilloscope, and allow a fifteen-minute warm-up period.
3. Connect the RF SWEEP SIGNAL OUTPUT of the sweep generator to the test points TP3 and TP4. (Figure 9)
4. Connect the oscilloscope vertical input directly to the test points TP1 and connect the shielded lead to the test point TP2.
5. Connect the SWEEP VOLTAGE OUTPUT to the sweep generator to the oscilloscope Horizontal input.
6. Proceed as outlined in the FM-IF ALIGNMENT CHART.

FM-IF ALIGNMENT CHART

Step	Equip.	Frequency Setting	Connection	Adjust. point	Pattern
1	Sweep generator of 10.7 MHz center freq. with 10.7 MHz marker.	Lowest Frequency	Set scope for connecting output signal from TP1 to vertical axis of scope "V" and sweep generator output to horizontal axis "H".	T101	 S CURVE

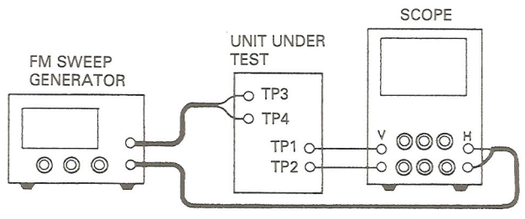


Figure 9

FM-RF ALIGNMENT

1. Turn on the signal generator and the VTVM, and allow a fifteen-minute warm-up period.
2. Connect the signal generator output through a 75 ohm dummy antenna across FM antenna. (Figure 10)
3. Connect the VTVM across the test points TP1 and TP2.
4. Set the volume control to mid-position.
5. Adjust the signal generator frequency as indicated in FM-RF ALIGNMENT CHART, and maintain a sufficient signal output level to provide a measurable indication.
6. Proceed as outlined in the FM-RF ALIGNMENT CHART.

FM-RF ALIGNMENT CHART

Step	Signal Generator	Radio Dial Setting	Adjustment	Remarks
1	90.1 MHz	Tune to signal.	Ant. Coil L001	Adjust for maximum output indication.
2	106.1 MHz		Ant. Trim. C003	
3	Repeat steps 1 and 2 required.			

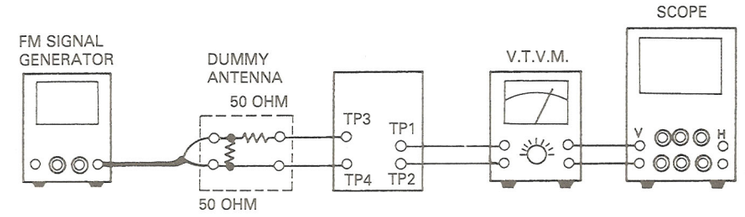


Figure 10

OUTPUT LEVEL ADJUSTMENT

1. Preliminary Work
   1) Place function switch in "NORMAL" position.
   2) Place Dolby switch in "IN" position.
   3) Load MTT-150 (ATT-150) 400 Hz test tape.
   4) Connect a lead (terminated with alligator clip) of VTVM to Dolby output terminal and another lead to chassis ground.

2. Level Adjustment
   1) Playback the test tape.
   2) Adjust trimming post semi-fixed resisstor R401 (L ch), R402 (R ch) until output reading of 100mV ±8mV is obtained on the VTVM, using alignmnet driver. (Proceed this alignment for both left and right channels.)

Note: When connecting alligator clip to the output terminal, clip it to C503 (or 13 pin of Q501), C504 (or 4 pin or Q501).

MOTOR SPEED ADJUSTMNET

1. Connect a VTVM or a Frequency counter to the headphone jack.
2. Insert cassette test tape (MTT-111, 3 kHz).
3. Playback the test tape in FWD direction about tape start.
4. Adjust R904 for 3000 Hz ±15 Hz reading on the frequency counter.

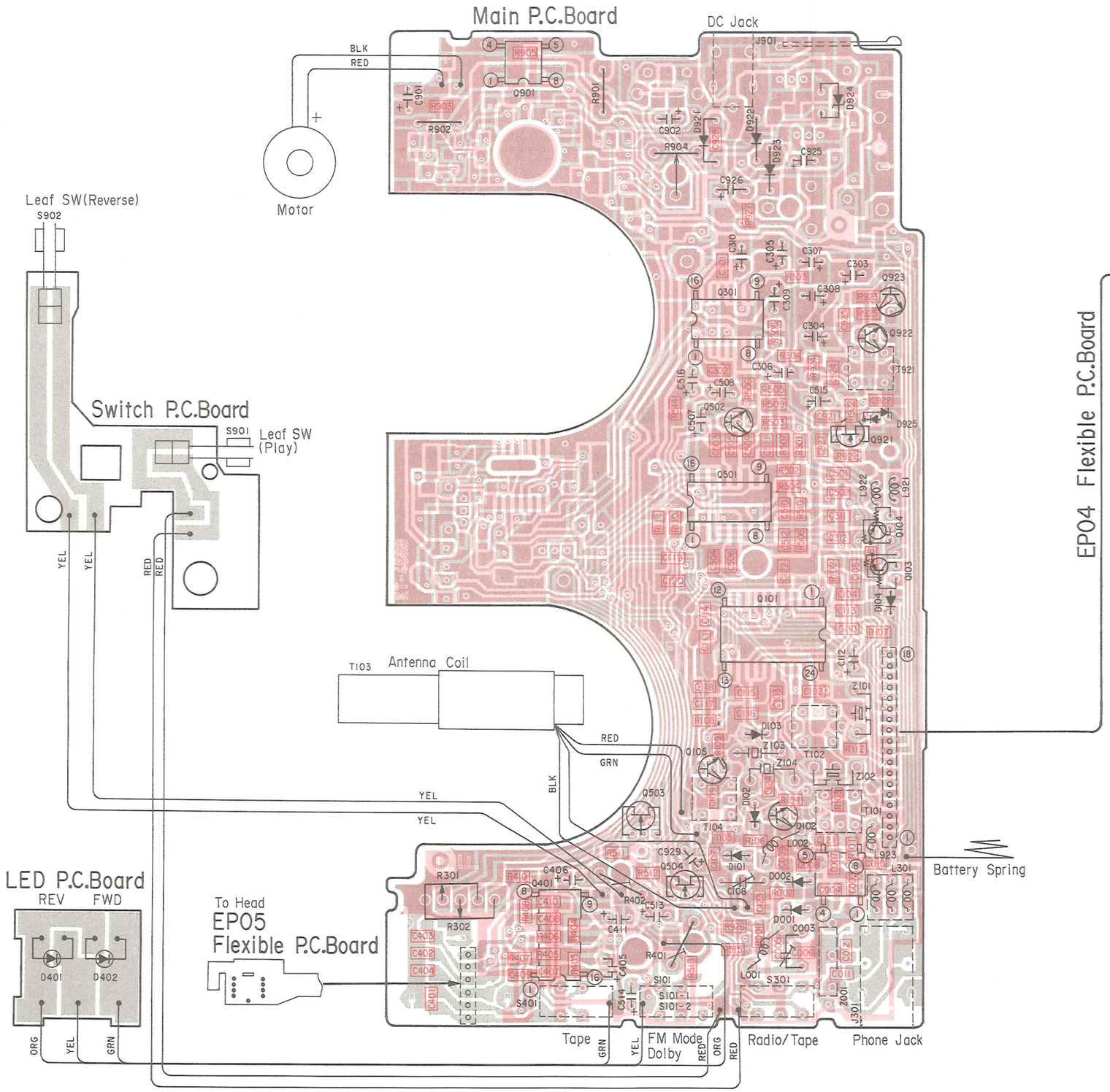
CURRENT CONSUMPTION

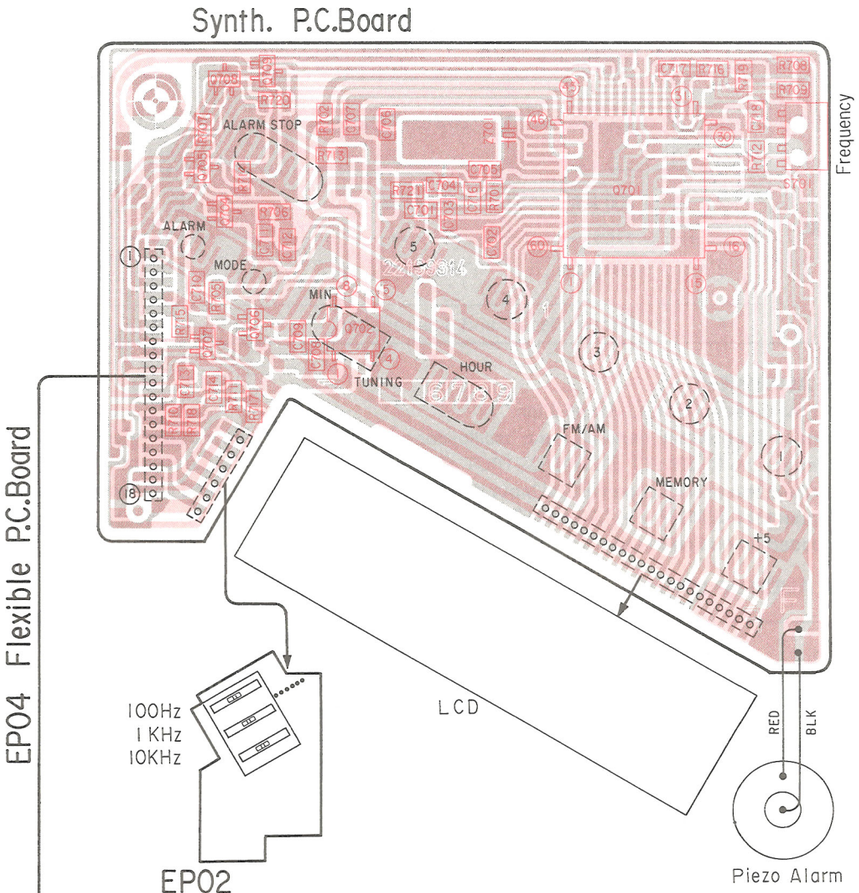
TAPE 160mA
FM 47mA
AM 37mA

CASSETTE MECHA. TORQUE

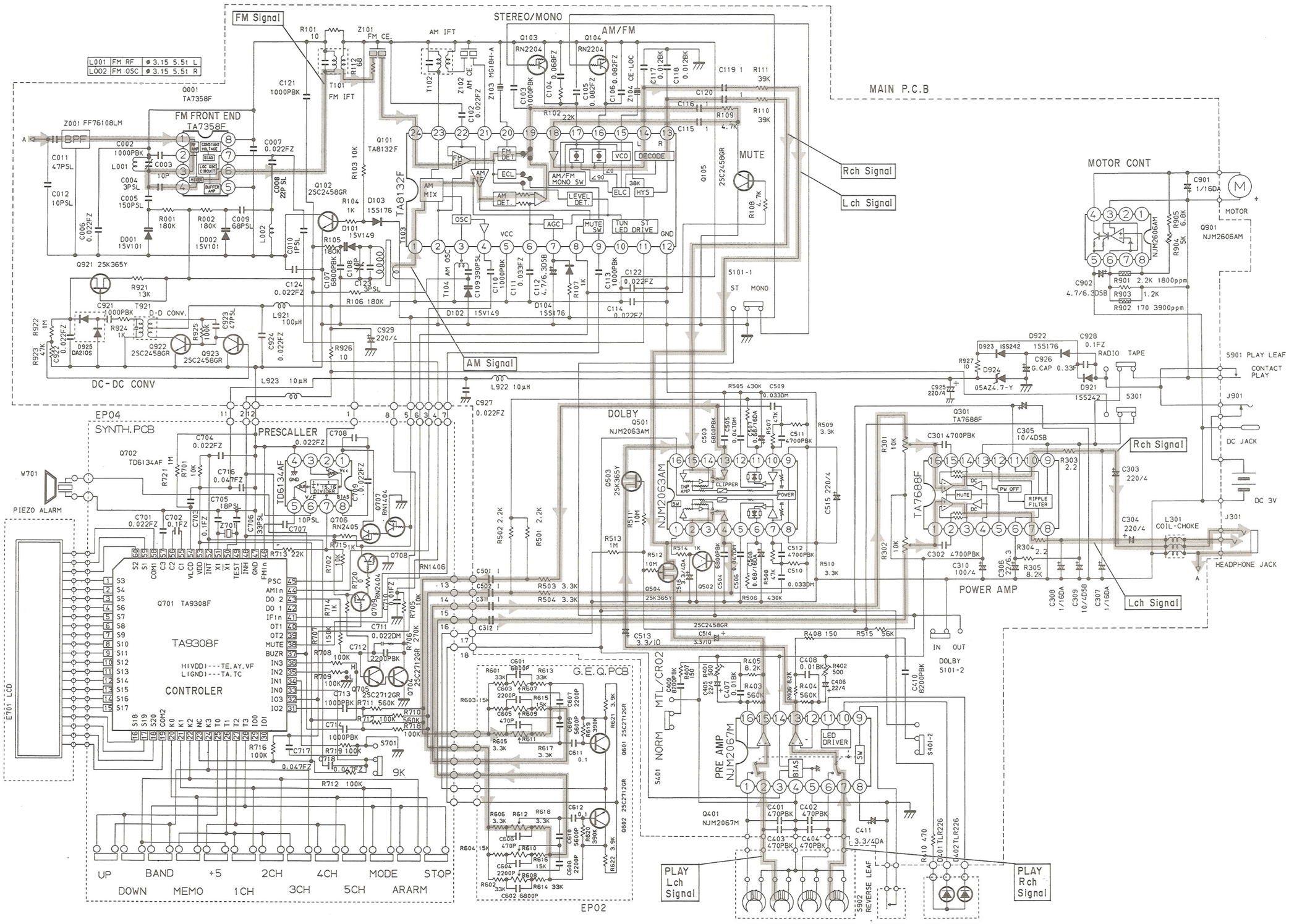
PLAY . . . . . 20 ∿ 55g · cm
FF/REW . . . . . More than 55g · cm

ELECTRICAL PARTS LOCATIONS





SCHEMATIC DIAGRAM



Q 0 0 1 (TA7358F)

	FM STEREO	FM MONO
1	921mV	921mV
2	1.64V	1.64V
3	2.82V	2.80V
4	1.60V	1.61V
5	0V	0V
6	2.78V	2.82V
7	2.76V	2.75V
8	2.80V	2.82V

Q 1 0 1 (TA8132AF)

	FM STEREO	FM MONO	AM MONO
1	2.85V	2.87V	2.93V
2	135mV	892mV	945mV
3	2.85V	2.87V	2.93V
4	2.85V	2.87V	2.59V
5	2.85V	140mV	2.93V
6	2.27V	2.26V	2.32V
7	1.49V	1.49V	280mV
8	82mV	82.1mV	81mV
9	2.85V	2.87V	2.93V
10	——	——	——
11	0V	2.37V	2.37V
12	0V	0V	0V
13	952mV	959mV	958mV
14	975mV	983mV	982mV
15	2.12V	2.38V	2.67V
16	1.68V	2.55V	2.91V
17	2.02V	2.86V	2.62V
18	624mV	625mV	623mV
19	1.34V	1.41V	1.26V
20	1.98V	2.00V	2.81V
21	2.84V	2.87V	2.92V
22	2.65V	2.68V	2.20V
23	2.85V	2.87V	2.93V
24	2.84V	2.86V	2.93V

Q 1 0 3 (RN2204)

	FM STEREO	FM MONO
E	2.85V	2.87V
C	2.02V	2.86V
B	2.82V	0V

Q 1 0 4 (RN2204)

	FM STEREO	FM MONO	AM
E	2.85V	2.87V	2.93V
C	1.87V	2.55V	2.63V
B	2.51V	2.51V	36mV

Q 1 0 5 (2SC2458)

	MUTE ON	MUTE OFF
E	0V	0V
C	0V	0V
B	661mV	1.3mV

Q 3 0 1 (TA7688F)

	PLAY
1	1.47V
2	1.47V
3	——
4	1.47V
5	——
6	2.52V
7	1.53V
8	0V
9	3.00V
10	1.52V
11	2.54V
12	——
13	2.99V
14	——
15	1.47V
16	1.47V

Q 5 0 1 (NJM2063AM)

	DOLBY IN	DOLBY OUT
1	61mV	772mV
2	1.26V	1.23V
3	——	——
4	1.25V	1.26V
5	1.26V	1.26V
6	1.42V	1.26V
7	1.26V	1.25V
8	0V	0V
9	1.26V	1.25V
10	1.26V	1.25V
11	1.78V	1.26V
12	1.26V	1.26V
13	1.26V	1.26V
14	——	——
15	1.26V	1.25V
16	2.54V	2.54V

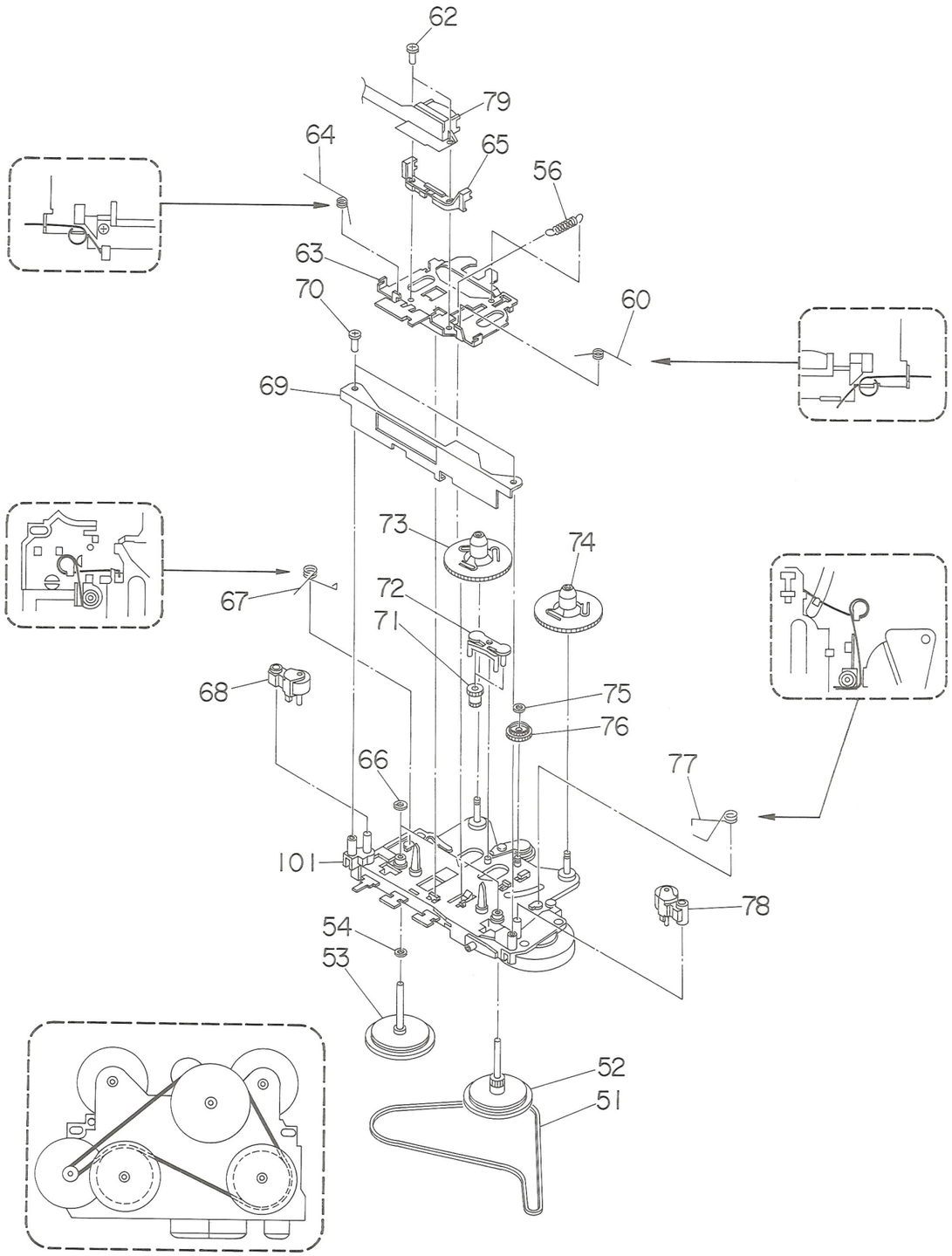
Q 9 0 1 (NJM2606AM)

	PLAY
1	——
2	——
3	2.97V
4	1.65V
5	0V
6	2.62V
7	——
8	1.93V

Q 4 0 1 (NJM2067M)

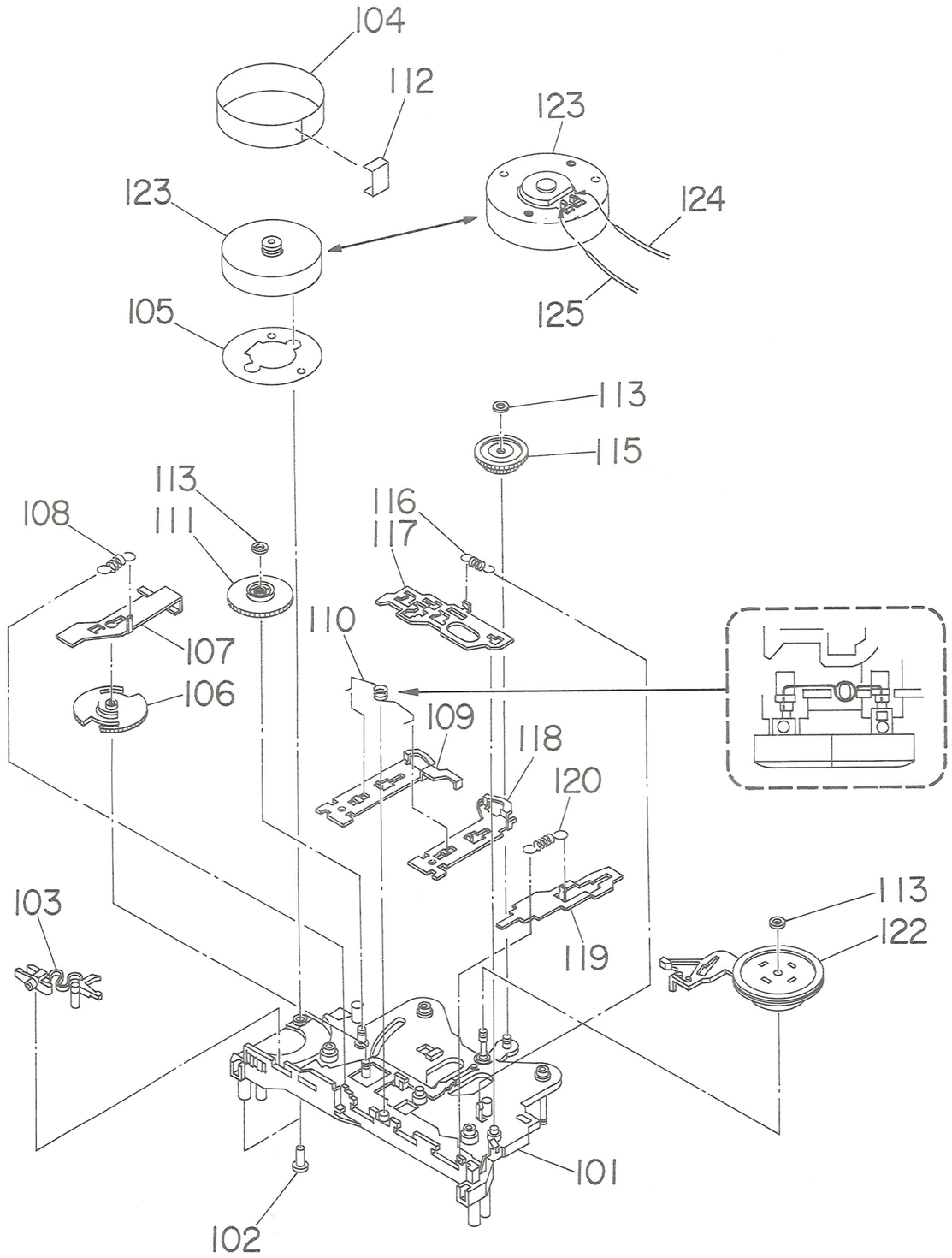
	NORMAL FWD	NORMAL REV	METAL FWD	METAL REV
1	1.47V	1.47V	1.47V	1.47V
2	1.47V	1.47V	1.47V	1.47V
3	2.54V	2.54V	2.54V	2.54V
4	1.47V	1.47V	1.47V	1.47V
5	0V	0V	0V	0V
6	1.47V	1.47V	1.47V	1.47V
7	1.47V	1.47V	1.47V	1.47V
8	575mV	49mV	575mV	49mV
9	0V	572mV	0V	559mV
10	1.60V	79mV	1.60V	79mV
11	40mV	1.61V	40mV	1.61V
12	137mV	137mV	1.47V	1.47V
13	1.54V	1.52V	1.54V	1.52V
14	1.47V	1.47V	1.47V	1.47V
15	1.56V	1.51V	1.56V	1.51V
16	1.47V	1.47V	1.47V	1.47V

MECHANISM EXPLODED VIEW (UPPER)



NOTE: Parts excluded in the parts list are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.

MECHANISM EXPLODED VIEW (LOWER)



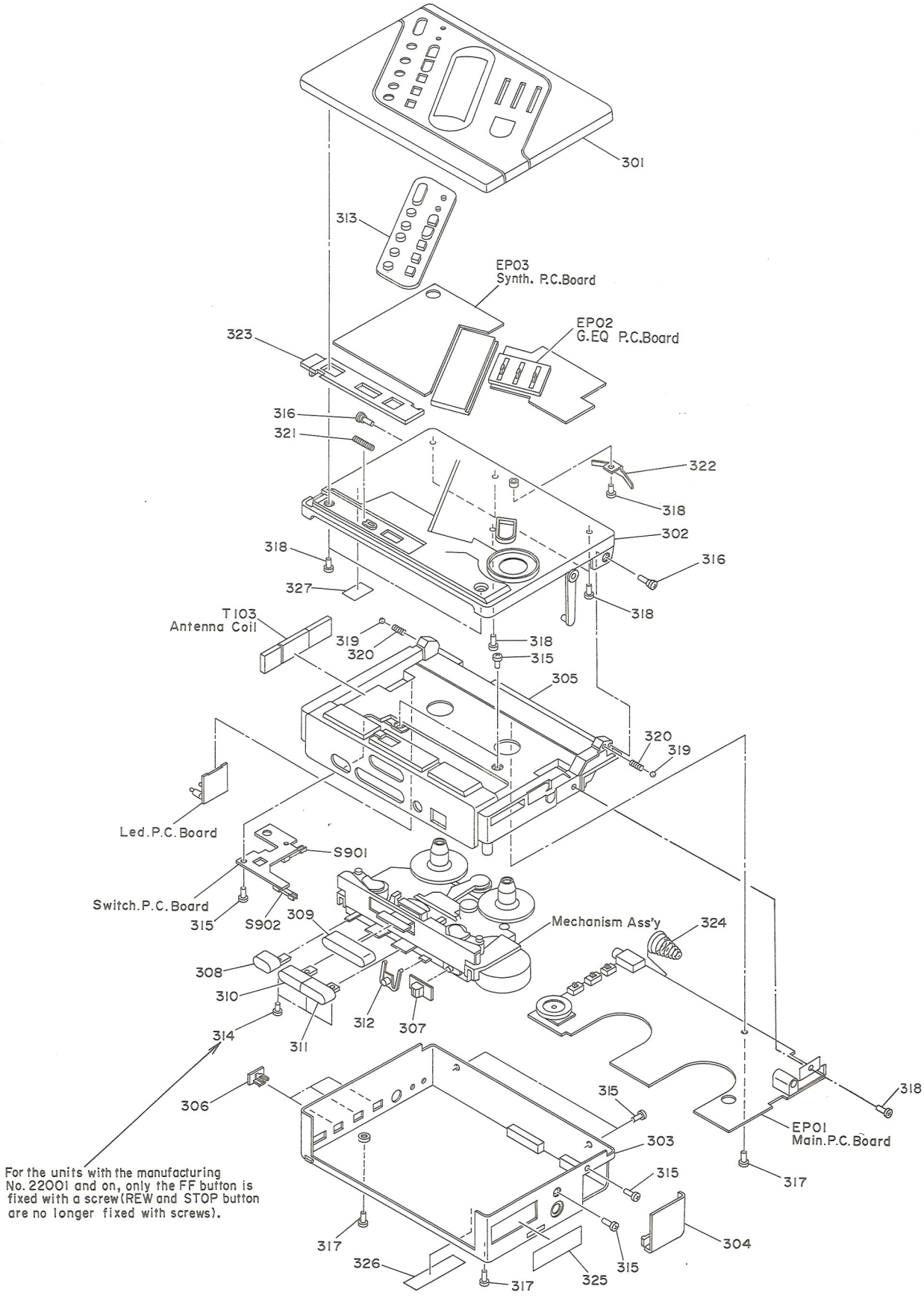
NOTE: Parts excluded in the parts list are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.

CASSETTE MECHANISM PARTS LIST

Location No.	Part No.	Description
51	25759175	BELT, CAPSTAN
52	25797283	FLYWHEEL ASSY, T
53	25797284	FLYWHEEL ASSY
54	25766541	WASHER, 2.1X4.0X0.2MM, TE
56	25770209	SPRING TENSION
60	25778684	SPRING
62	22709279	SCREW, 1.4X3.8MM
64	25778685	SPRING
66	25735296	RING, 1.6X3.2X0.25MM
67	25778686	SPRING
68	25797280	ROLLER ASSY, PRESSURE
70	22707638	SCREW, 1.7X4.5MM, B, BID
71	25757317	GEAR, FR
72	25747437	LEVER, FR
73	25757318	GEAR, S REEL
74	25757319	GEAR, T REEL
75	25766542	WASHER, 1.6X3.5X0.13MM, PE
76	25757320	GEAR, R
77	25778687	SPRING
78	25797281	ROLLER ASSY, PRESSURE
79	22217550	HEAD, PLAYBACK
102	22709280	SCREW, 1.4X3MM
103	25747438	LEVER, MODE
106	25757321	GEAR, CAM
108	25770210	SPRING DIR. LEVER
110	25778688	SPRING FF LEVER
111	25757322	GEAR, DECELERATION
113	25766543	WASHER, 1.25X3.5X0.25MM, PE
115	25757323	GEAR, T
116	25770211	SPRING LOCK PLATE
120	25770212	SPRING TENSION
122	25797282	WHEEL ASSY, MIDWAY
123	25792459	MOTOR ASSY

Location No.	Part No.	Description

CABINET EXPLODED VIEW



NOTE: Parts excluded in the parts list are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.

CABINET PARTS LIST

Location No.	Part No.	Description
301	25889818	CABINET ASSY, DECO.
302	25889819	CABINET ASSY, FRONT
303	25889820	CABINET ASSY, BACK
304	25889821	COVER ASSY, BATTERY
305	25887750	CABINET, CENTER
306	25888672	KNOB, SLIDE
307	25888530	KNOB, SLIDE REVERSE
308	25888528	BUTTON STOP
309	25888525	BUTTON PLAY
310	25888527	BUTTON REW
311	25888526	BUTTON FF
312	25888529	BUTTON MANUAL
313	25888552	BUTTON, RUBBER SHEET
314	22708882	SCREW, 1.4X2.5MM, B, APAN
315	22707651	SCREW, 1.7X4MM, B, 12PAN
316	22707789	SCREW, 1.7X5MM
317	22708325	SCREW, 1.7X6MM, N, 12PAN
318	22708908	SCREW, 1.4X3.2MM, N, PAN
319	25757129	STEEL BALL, 2.0MM
320	25777768	SPRING
321	25777149	SPRING
322	25779659	SPRING
323	25888518	PLATE, LOCK
324	25777769	SPRING, BATTERY
325	22900918	LABEL, DOLBY
326	22900919	NAME LABEL TE,AY,VF
326	22900932	NAME LABEL USA,CANADA
327	22900950	LABEL, FREQUENCY

Location No.	Part No.	Description

PARTS LIST

ABBREVIATIONS

1. **CAPACITOR:** CD = Ceramic Disk, PF = Plastic Film, BL = Barrier Layer, EL = Electrolytic, MY = Mylar, PP = Polypropylene, PS = Polystyrene, TT = Tantalum, PE = Polyethylene
   MFD = Microfarad, PF = Picofarad, V = Voltage, NP = Non Polarity
2. **RESISTOR:** CF = Carbon Film, CC = Carbon Composition, OMF = Oxide Metal Film, MF = Metal Film
   K = Kilo (1000), M = Mega (1000000)
3. **TOLERANCE**

Symbol	F	G	J	K	M	N	Z	P
%	±1	±2	±5	±10	±20	±30	−20+80	0+100

Symbol	C	D
pF	±0.25	±0.5

Location No.	Part No.	Description
IC'S/TRANSISTORS		
Q001	B0325505	IC, TA7358F
Q101	B0377803	IC, TA8132F
Q102	A6332440	TRANSISTOR, 2SC2458-GR
Q103	A6012040	TRANSISTOR, RN2204
Q104	A6012040	TRANSISTOR, RN2204
Q105	A6332440	TRANSISTOR, 2SC2458-GR
Q301	B0356892	IC, TA7688F(SO)
Q401	22117721	IC, NJM2067M
Q501	22117797	IC, NJM2063AM
Q502	A6332440	TRANSISTOR, 2SC2458-GR
Q503	A6058710	TRANSISTOR, 2SK365-Y, FET
Q504	A6058710	TRANSISTOR, 2SK365-Y, FET
Q901	22117812	IC, NJM2606M
Q921	A6058710	TRANSISTOR, 2SK365-Y, FET
Q922	A6332440	TRANSISTOR, 2SC2458-GR
Q923	A6332440	TRANSISTOR, 2SC2458-GR
DIODES		
D001	22119206	DIODE, 1SV101(PAIR)
D002	22119206	DIODE, 1SV101(PAIR)
D101	22119207	DIODE, 1SV149(PAIR)
D102	22119207	DIODE, 1SV149(PAIR)
D103	A7160570	DIODE, 1SS176
D104	A7160570	DIODE, 1SS176
D401	A8603121	DIODE, TLR226, LED
D402	A8603121	DIODE, TLR226, LED
D921	A7153050	DIODE, 1SS242
D922	A7160570	DIODE, 1SS176
D923	A7153050	DIODE, 1SS242
D924	A7112240	DIODE, 05AZ4.7-Y, ZENER
D925	22119474	DIODE, DA210S
IC'S/TRANSISTORS		
Q701	22128592	IC, TC9308F-005BR
Q702	B0271045	IC, TD6134AF
Q704	A6335480	TRANSISTOR, 2SC2712-GR, CHIP
Q705	A6335480	TRANSISTOR, 2SC2712-GR, CHIP
Q706	A6014050	TRANSISTOR, RN2405, CHIP
Q707	A6004040	TRANSISTOR, RN1404, CHIP
Q708	A6004060	TRANSISTOR, RN1406, CHIP
Q709	A6014040	TRANSISTOR, RN2404, CHIP
ELECTRICAL PARTS		
EP01	22130865	PC BOARD ASSY, MAIN OTHERS
EP01	22130866	PC BOARD ASSY, MAIN TA,TC,TE,AY
EP02	22657504	PC BOARD ASSY, G. EQ.
EP05	22199339	PC BOARD, FLEXIBLE, HEAD
J301	22198326	JACK HEADPHONE
J901	22198163	JACK, 4.0MM, DC POWER
L001	22294644	COIL FM RF
L002	22294638	COIL FM OSC.
L301	22291506	CHOKE COIL
L921	22291435	CHOKE COIL, 100UH
L922	22291423	CHOKE COIL, 10UH
L923	22291423	CHOKE COIL, 10UH
S101	22196709	SLIDE SWITCH FM MODE/DOLBY NR
S301	22196709	SLIDE SWITCH RADIO/TAPE
S401	22196709	SLIDE SWITCH TAPE SELECTOR
S901	22108115	LEAF SWITCH PLAY
S902	22108115	LEAF SWITCH REVERSE
T101	22265925	IF TRANSFORMER FM
T102	22264970	IF TRANSFORMER AM

Location No.	Part No.	Description
T103	22243154	COIL, BAR ANTENNA
T104	22245524	COIL AM OSC
T921	22292253	COIL, D/D CONV.
Z001	22153480	FILTER, BAND-PASS
Z101	22153160	FILTER, CERAMIC, 10.7M5-MR
Z102	22153449	FILTER, CERAMIC, AM
Z103	22153567	FILTER, CERAMIC, 10.7MG18H-A
Z104	22153436	OSCILLATOR, CERAMIC

ELECTRICAL PARTS

EP03	22130863	PC BOARD ASSY, SYNTH TE,AY,VF
EP03	22130864	PC BOARD ASSY, SYNTH USA,CANADA
EP04	22199307	PC BOARD, FLEXIBLE, MAIN
S701	22108148	SLIDE SWITCH FREQUENCY
Z701	22153573	OSCILLATOR, CRYSTAL, 75K

CAPACITORS

C002	20363102	CD, 1000PF, 50V, K, CHIP
C003	22309242	TRIMMER, 10PF
C004	20331309	CD, 3PF, 50V, C, CHIP
C005	20331151	CD, 150PF, 50V, J, CHIP
C006	20364223	CD, 0.022MFD, 25V, Z, CHIP
C007	20364223	CD, 0.022MFD, 25V, Z, CHIP
C008	20331220	CD, 22PF, 50V, J, CHIP
C009	20331680	CD, 68PF, 50V, J, CHIP
C010	20331109	CD, 1PF, 50V, C, CHIP
C011	20331470	CD, 47PF, 50V, J, CHIP
C012	20331100	CD, 10PF, 50V, D, CHIP
C102	20364223	CD, 0.022MFD, 25V, Z, CHIP
C103	20363102	CD, 1000PF, 50V, K, CHIP
C104	20364683	CD, 0.068MFD, 25V, Z, CHIP
C105	20364823	CD, 0.082MFD, 25V, Z, CHIP
C106	20364823	CD, 0.082MFD, 25V, Z, CHIP
C107	20363682	CD, 6800PF, 50V, K, CHIP
C108	22309280	TRIMMER, 10PF
C109	20331391	CD, 390PF, 50V, J, CHIP
C110	20363102	CD, 1000PF, 50V, K, CHIP
C111	20364333	CD, 0.033MFD, 25V, Z, CHIP
C112	20473479	TT, 4.7MFD, 6.3V, M
C113	20363102	CD, 1000PF, 50V, K, CHIP
C114	20364223	CD, 0.022MFD, 25V, Z, CHIP
C115	20360006	CD, 1MFD, 16V, Z, CHIP
C116	20360006	CD, 1MFD, 16V, Z, CHIP
C117	20366123	CD, 0.012MFD, 25V, K, CHIP
C118	20366123	CD, 0.012MFD, 25V, K, CHIP
C119	20360006	CD, 1MFD, 16V, Z, CHIP
C120	20360006	CD, 1MFD, 16V, Z, CHIP
C121	20363102	CD, 1000PF, 50V, K, CHIP
C122	20364223	CD, 0.022MFD, 25V, Z, CHIP
C123	20331309	CD, 3PF, 50V, C, CHIP
C124	20364223	CD, 0.022MFD, 25V, Z, CHIP
C301	20363472	CD, 4700PF, 50V, K, CHIP
C302	20363472	CD, 4700PF, 50V, K, CHIP
C303	20422221	EL, 220MFD, 4V
C304	20432221	EL, 220MFD, 4V
C305	20472100	TT, 10MFD, 4V, M
C306	20423220	EL, 22MFD, 6.3V
C307	20465109	TT, 1MFD, 16V, M
C308	20465109	TT, 1MFD, 16V, M
C309	20472100	TT, 10MFD, 4V, M
C310	20422101	EL, 100MFD, 4V
C311	20360006	CD, 1MFD, 16V, Z, CHIP
C312	20360006	CD, 1MFD, 16V, Z, CHIP
C401	20363471	CD, 470PF, 50V, K, CHIP
C402	20363471	CD, 470PF, 50V, K, CHIP
C403	20363471	CD, 470PF, 50V, K, CHIP
C404	20363471	CD, 470PF, 50V, K, CHIP
C405	20432220	EL, 22MFD, 4V
C406	20432220	EL, 22MFD, 4V
C407	20366103	CD, 0.01MFD, 25V, K, CHIP
C408	20366103	CD, 0.01MFD, 25V, K, CHIP
C409	20363822	CD, 8200PF, 50V, K, CHIP
C410	20363822	CD, 8200PF, 50V, K, CHIP
C411	20464339	TT, 3.3MFD, 10V, M
C501	20360006	CD, 1MFD, 16V, Z, CHIP
C502	20360006	CD, 1MFD, 16V, Z, CHIP
C503	20363682	CD, 6800PF, 50V, K, CHIP
C504	20363682	CD, 6800PF, 50V, K, CHIP
C505	20365473	CD, 0.047MFD, 25V, M, CHIP
C506	20365473	CD, 0.047MFD, 25V, M, CHIP
C507	20465688	TT, 0.68MFD, 16V, M
C508	20465688	TT, 0.68MFD, 16V, M
C509	20365333	CD, 0.033MFD, 25V, M, CHIP
C510	20365333	CD, 0.033MFD, 25V, M, CHIP
C511	20363472	CD, 4700PF, 50V, K, CHIP
C512	20363472	CD, 4700PF, 50V, K, CHIP
C513	20464339	TT, 3.3MFD, 10V, M
C514	20464339	TT, 3.3MFD, 10V, M
C515	20432221	EL, 220MFD, 4V
C516	20464339	TT, 3.3MFD, 10V, M
C901	20465109	TT, 1MFD, 16V, M
C902	20473479	TT, 4.7MFD, 6.3V, M
C921	20363102	CD, 1000PF, 50V, K, CHIP
C922	20364223	CD, 0.022MFD, 25V, Z, CHIP
C923	20331470	CD, 47PF, 50V, J, CHIP
C924	20364223	CD, 0.022MFD, 25V, Z, CHIP
C925	20432221	EL, 220MFD, 4V
C926	20400009	EL, 0.33FD, 2.4V
C927	20364223	CD, 0.022MFD, 25V, Z, CHIP
C928	20364104	CD, 0.1MFD, 25V, Z, CHIP
C929	20432221	EL, 220MFD, 4V

Location No.	Part No.	Description
CAPACITORS		
C701	20364223	CD, 0.022MFD, 25V, Z, CHIP
C702	20364104	CD, 0.1MFD, 25V, Z, CHIP
C703	20364104	CD, 0.1MFD, 25V, Z, CHIP
C704	20364223	CD, 0.022MFD, 25V, Z, CHIP
C705	20331180	CD, 18PF, 50V, J, CHIP
C706	20331330	CD, 33PF, 50V, J, CHIP
C707	20331100	CD, 10PF, 50V, D, CHIP
C708	20364223	CD, 0.022MFD, 25V, Z, CHIP
C709	20364223	CD, 0.022MFD, 25V, Z, CHIP
C710	20364103	CD, 0.01MFD, 25V, Z, CHIP
C711	20365223	CD, 0.022MFD, 25V, M, CHIP
C712	20363222	CD, 2200PF, 50V, K, CHIP
C713	20363102	CD, 1000PF, 50V, K, CHIP
C714	20363102	CD, 1000PF, 50V, K, CHIP
C716	20364473	CD, 0.047MFD, 25V, Z, CHIP
C717	20364473	CD, 0.047MFD, 25V, Z, CHIP
C718	20364473	CD, 0.047MFD, 25V, Z, CHIP
RESISTORS		
R001	20541184	OMF, 180K OHM, 1/10W, J, CHIP
R002	20541184	OMF, 180K OHM, 1/10W, J, CHIP
R101	20541100	OMF, 10 OHM, 1/10W, J, CHIP
R102	20541223	OMF, 22K OHM, 1/10W, J, CHIP
R103	20541103	OMF, 10K OHM, 1/10W, J, CHIP
R104	20541102	OMF, 1K OHM, 1/10W, J, CHIP
R105	20541184	OMF, 180K OHM, 1/10W, J, CHIP
R106	20541184	OMF, 180K OHM, 1/10W, J, CHIP
R107	20541102	OMF, 1K OHM, 1/10W, J, CHIP
R108	20541472	OMF, 4.7K OHM, 1/10W, J, CHIP
R109	20541472	OMF, 4.7K OHM, 1/10W, J, CHIP
R110	20541393	OMF, 39K OHM, 1/10W, J, CHIP
R111	20541393	OMF, 39K OHM, 1/10W, J, CHIP
R112	20541680	OMF, 68 OHM, 1/10W, J, CHIP
R301	22650501	VARIABLE, 10K OHM, A VOL.(WITH R302)
R303	20541229	OMF, 2.2 OHM, 1/10W, J, CHIP
R304	20541229	OMF, 2.2 OHM, 1/10W, J, CHIP
R305	20541822	OMF, 8.2K OHM, 1/10W, J, CHIP
R401	22658756	VARIABLE, SEMI FIXED, 500-B DOLBY ADJUST
R402	22658756	VARIABLE, SEMI FIXED, 500-B DOLBY ADJUST
R403	20541564	OMF, 560K OHM, 1/10W, J, CHIP
R404	20541564	OMF, 560K OHM, 1/10W, J, CHIP
R405	20541822	OMF, 8.2K OHM, 1/10W, J, CHIP
R406	20541822	OMF, 8.2K OHM, 1/10W, J, CHIP
R407	20541151	OMF, 150 OHM, 1/10W, J, CHIP
R408	20541151	OMF, 150 OHM, 1/10W, J, CHIP
R410	20541471	OMF, 470 OHM, 1/10W, J, CHIP
R501	20541222	OMF, 2.2K OHM, 1/10W, J, CHIP
R502	20541222	OMF, 2.2K OHM, 1/10W, J, CHIP
R503	20541332	OMF, 3.3K OHM, 1/10W, J, CHIP
R504	20541332	OMF, 3.3K OHM, 1/10W, J, CHIP
R505	20541434	OMF, 430K OHM, 1/10W, J, CHIP
R506	20541434	OMF, 430K OHM, 1/10W, J, CHIP
R507	20541473	OMF, 47K OHM, 1/10W, J, CHIP
R508	20541473	OMF, 47K OHM, 1/10W, J, CHIP
R509	20541332	OMF, 3.3K OHM, 1/10W, J, CHIP
R510	20541332	OMF, 3.3K OHM, 1/10W, J, CHIP
R511	20541106	OMF, 10M OHM, 1/10W, K, CHIP
R512	20541106	OMF, 10M OHM, 1/10W, K, CHIP
R513	20541105	OMF, 1M OHM, 1/10W, K, CHIP
R514	20541102	OMF, 1K OHM, 1/10W, J, CHIP
R515	20541563	OMF, 56K OHM, 1/10W, J, CHIP
R901	20520065	CF, 2.2K OHM, 1/8W, J, LINEAR
R902	20520047	CF, 170 OHM, 1/8W, J, LINEAR
R903	20541122	OMF, 1.2K OHM, 1/10W, J, CHIP
R904	22658760	VARIABLE, SEMI FIXED, 5K-B SPEED ADJUST
R905	20541682	OMF, 6.8K OHM, 1/10W, J, CHIP
R921	20541133	OMF, 13K OHM, 1/10W, J, CHIP
R922	20541105	OMF, 1M OHM, 1/10W, K, CHIP
R923	20541473	OMF, 47K OHM, 1/10W, J, CHIP
R924	20541102	OMF, 1K OHM, 1/10W, J, CHIP
R925	20541104	OMF, 100K OHM, 1/10W, J, CHIP
R926	20541100	OMF, 10 OHM, 1/10W, J, CHIP
R927	20541100	OMF, 10 OHM, 1/10W, J, CHIP
RESISTORS		
R701	20541103	OMF, 10K OHM, 1/10W, J, CHIP
R702	20541103	OMF, 10K OHM, 1/10W, J, CHIP
R705	20541103	OMF, 10K OHM, 1/10W, J, CHIP
R706	20541274	OMF, 270K OHM, 1/10W, J, CHIP
R707	20541154	OMF, 150K OHM, 1/10W, J, CHIP
R708	20541104	OMF, 100K OHM, 1/10W, J, CHIP
R709	20541104	OMF, 100K OHM, 1/10W, J, CHIP
R710	20541564	OMF, 560K OHM, 1/10W, J, CHIP
R711	20541564	OMF, 560K OHM, 1/10W, J, CHIP
R712	20541104	OMF, 100K OHM, 1/10W, J, CHIP
R713	20541223	OMF, 22K OHM, 1/10W, J, CHIP
R714	20541102	OMF, 1K OHM, 1/10W, J, CHIP
R715	20541102	OMF, 1K OHM, 1/10W, J, CHIP
R716	20541104	OMF, 100K OHM, 1/10W, J, CHIP
R717	20541104	OMF, 100K OHM, 1/10W, J, CHIP
R718	20541104	OMF, 100K OHM, 1/10W, J, CHIP
R719	20541104	OMF, 100K OHM, 1/10W, J, CHIP
R720	20541000	OMF, 0 OHM, 1/10W, J, CHIP
R721	20541105	OMF, 1M OHM, 1/10W, K, CHIP

Location No.	Part No.	Description
		ACCESSORIES
AC01	22908718	OWNER'S MANUAL EUROPE
AC01	22908770	OWNER'S MANUAL USA
AC01	22908771	OWNER'S MANUAL CANADA
AC01	22908772	OWNER'S MANUAL AUSTRALIA
AC01	22908773	OWNER'S MANUAL OTHERS
AC02	22957628	SHEET, CAUTION USA
AC03	22152738	HEADPHONE, HR-M31-S TA,TA,TE,AY
AC03	22152755	HEADPHONE, HR-P6-K OTHERS
AC04	25875071	HOLDER, UNIT TA,TC,TE,AY
AC05	22810109	EAR PAD SET TA,TA,AY,TE
AC05	22810161	EAR PAD SET OTHERS
AC06	22991196	CARRYING CASE OTHERS

Location No.	Part No.	Description

TOSHIBA CORPORATION
1-1, SHIBAURA 1-CHOME, MINATO-KU, TOKYO 105, JAPAN